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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/664,089	09/17/2003	Hiroyuki Sekiguchi	03886/0200058-US0	3720
7278	7590	03/02/2006	EXAMINER	
DARBY & DARBY P.C.			MANCHO, RONNIE M	
P. O. BOX 5257			ART UNIT	
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3663

DATE MAILED: 03/02/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

**Office Action Summary**

Application No.

10/664,089

Applicant(s)

SEKIGUCHI, HIROYUKI

Examiner

Ronnie Mancho

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --  
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on 08 February 2006.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 1,2 and 4-14 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1,2 and 4-14 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some \* c) ☐ None of:
- 1) ☒ Certified copies of the priority documents have been received.
  - 2) ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  - 3) ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- \* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- |  |   |
|--|---|
| 1) <input type="checkbox"/> Notice of References Cited (PTO-892)   | 4) <input type="checkbox"/> Interview Summary (PTO-413)<br>Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)                                   | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152)             |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)<br>Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____  |

## DETAILED ACTION

### *Claim Rejections - 35 USC § 112*

1. The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

2. Claims 1, 2, 4-14 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

In claim 1, the applicant claims “evacuation possibility”. It is not clear what all is meant and encompassed by the phrase “evacuation possibility”. This is not an art recognized word and applicant has not disclosed what is meant by or how “evacuation possibility” is achieved to one skilled in the art.

In addition, in claim 2, the applicant claims “the own vehicle traveling path estimating means estimate an own vehicle traveling path based on the road information as *a first own vehicle traveling path*, estimates an own vehicle traveling path based on said traveling condition of the own vehicle as *a second own vehicle traveling path*, and estimates *a new own vehicle traveling path* based on said first own vehicle traveling path and said second own vehicle traveling path”. These limitations indicate three different paths, but the specification or the drawings do not clearly disclose three distinct paths as claimed.

It is not clear what all is meant and encompassed by the limitations indicated above in claim 2.

Further in claim 6, the applicant claims, “the evacuation possibility is greater”. This is indefinite. It is not clear what all is meant and encompassed by “greater”. The applicant further claims “the numerical values” in claim 6. There is no antecedent basis for the limitation.

In claim 8, “clears the sum” lacks antecedent basis. Further in claim 8, the applicant claims, “evacuation of the preceding vehicle is less”. This is indefinite. It is not clear what all is meant and encompassed by “less”. The applicant further claims “the numerical values” in claim 6. There is no antecedent basis for the limitation. It should be clear that the applicant is not consistent with the claim language

Amended claims 2, 6, 8 & 9 are verbose and not clear.

The rest of the claims are rejected for their dependence on a rejected base claim.

MPEP 2173. Claims Must Particularly Point Out and Distinctly Claim the Invention. The primary purpose of this requirement of definiteness of claim language is to ensure that the scope of the claims is clear so the public is informed of the boundaries of what constitutes infringement of the patent. A secondary purpose is to provide a clear measure of what applicants regard as the invention so that it can be determined whether the claimed invention meets all the criteria for patentability and whether the specification meets the criteria of 35 U.S.C. 112, first paragraph with respect to the claimed invention.

*MPEP 2173.01 [R-2] Claim Terminology.*

A fundamental principle contained in 35 U.S.C. 112, second paragraph is that applicants are their own lexicographers. They can define in the claims what they regard as their invention essentially in whatever terms they choose so long as \*\*>any special meaning assigned to a term is clearly set forth in the specification. See MPEP § 2111.01.<Applicant may use functional

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language, alternative expressions, negative limitations, or any style of expression or format of claim which makes clear the boundaries of the subject matter for which protection is sought. As noted by the court in *In re Swinehart*, 439 F.2d 210, 160 USPQ 226 (CCPA 1971), a claim may not be rejected solely because of the type of language used to define the subject matter for which patent protection is sought.

***Claim Rejections - 35 USC § 102***

1. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

2. Claims 1, 2, 4-14 are rejected under 35 U.S.C. 102(b) as being anticipated by Lemelson et al (5983161).

Regarding claim 1, Lemelson et al (abstract) disclose a vehicle surroundings monitoring apparatus, comprising:

frontal information detecting means (54, 56; fig. 3) for detecting at least solid object information in front of an own vehicle;

preceding vehicle recognizing means (54, 56; fig. 3) for recognizing a preceding vehicle based on said solid object information;

own vehicle traveling path estimating means (54, 56; fig. 3) for estimating a traveling path for said own vehicle to travel on a road ahead of the own vehicle as a traveling path of the own vehicle;

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first evacuation possibility judging means 54 that judges an evacuation possibility of said preceding vehicle to evacuate from the state of being the preceding vehicle of the own vehicle according to the position of said preceding vehicle and the position of said own vehicle;

second evacuation possibility judging means 56 (col. 20, lines 55-67) that judges an evacuation possibility of said preceding vehicle to evacuate from the state of being the preceding vehicle of the own vehicle according to information of a solid object other than said preceding vehicle (columns 19, 20, 27, 29); and

preceding vehicle evacuation possibility judging means 38 (col. 24, lines 33-44) that judges a possibility of evacuation of said preceding vehicle to evacuate from the state of being the preceding vehicle of the own vehicle (columns 19, 20, 27, 29) according to the possibility of evacuation by the first evacuation possibility judging means and said possibility of evacuation by the second evacuation possibility judging means.

Regarding claim 2, Lemelson et al (columns 19, 20, 27, 29) disclose the vehicle surroundings monitoring apparatus described in claim 1, wherein said frontal information detecting means detect road information in front of said own vehicle in addition to said solid object information and have traveling conditions detecting means for detecting a traveling condition of said own vehicle, and

said own vehicle traveling path estimating means estimate an own vehicle traveling path based on the road information as a first own vehicle traveling path, estimates an own vehicle traveling path based on said traveling condition of the own vehicle as a second own vehicle traveling path, and estimates a new own vehicle traveling path based on said first own vehicle traveling path and said second own vehicle traveling path.

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Regarding claim 4, Lemelson et al (columns 19, 20, 27, 29) disclose the vehicle surroundings monitoring apparatus described in claim 1, wherein said first evacuation possibility judging means judge the possibility of the evacuation of said preceding vehicle when viewed from said own vehicle according to a frontal distance of said preceding vehicle from said own vehicle and a lateral separation of said preceding vehicle from said new own traveling path.

Regarding claim 5, Lemelson et al (columns 19, 20, 27, 29) disclose the vehicle surroundings monitoring apparatus described in claim 1, wherein said preceding vehicle evacuation possibility judging means judge that when said preceding vehicle exists farther than a pre-established distance, there is no possibility of evacuation of said preceding vehicle.

Regarding claim 6, Lemelson et al (columns 19, 20, 27, 29) disclose the vehicle surroundings monitoring apparatus described in claim 1, wherein said first evacuation possibility judging means provides a plurality of distance divisions in front of said own vehicle, establishes evacuation possibility judging regions in predetermined left and right areas around the traveling path of the own vehicle respective distance divisions, judges that the evacuation possibility is greater when said preceding vehicle is in said evacuation possibility judging regions and expresses that the evacuation possibility is greater as a specified numerical value, and

said preceding vehicle evacuation possibility judging means judges that there is a possibility of evacuation of said preceding vehicle when a sum of the numerical values expressing the evacuation possibility exceeds a predetermined threshold value.

Regarding claim 7, Lemelson et al (columns 19, 20, 27, 29) disclose the vehicle surroundings monitoring apparatus according to in claim 6, wherein said distance divisions provided by the first evacuation possibility judging means comprise a first division near the own

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vehicle, a second division in front of the first division and a third division in front of the second division.

Regarding claim 8, Lemelson et al (columns 19, 20, 27, 29) disclose the vehicle surroundings monitoring apparatus according to claim 6, wherein when said preceding vehicle exists in a pre-established region in the vicinity of the traveling path of the own vehicle, the first evacuation possibility judging means clears the sum of the numerical values, and

when said preceding vehicle is not judged to be in the pre-established region in the vicinity of said traveling path of the own vehicle and in the respective evacuation possibility judging regions, the first evacuation possibility judging means judges that the possibility of the relative evacuation of the preceding vehicle is less, and in response, reduces the sum of said numerical values to a predetermined value that expresses the evacuation possibility.

Regarding claim 9, Lemelson et al (columns 19, 20, 27, 29) disclose the vehicle surroundings monitoring apparatus according to claim 6, wherein when a solid object, moving forward substantially in the same direction as the own vehicle and different from said preceding vehicle, exists in a traveling region of the own vehicle in the vicinity of the preceding vehicle, the second evacuation possibility judging means judges that the evacuation possibility is greater and expresses the evacuation possibility as a specified numerical value, and adds the numerical value to the sum of said numerical values expressing that the evacuation possibility is greater, as judged by the preceding evacuation possibility judging means.

Regarding claim 10, Lemelson et al (columns 19, 20, 27, 29) disclose a traveling control system for controlling a traveling of an own vehicle wherein:



the own vehicle is provided with the vehicle surroundings monitoring apparatus according to claims 1, and information of an evacuation possibility of the preceding vehicle by the vehicle surroundings monitoring apparatus is information of the preceding vehicle.

3. The statements of intended use or field of use, "judges", "estimating", "when a sum.....exceeds" "reduces", or "adds", etc clauses are essentially method limitations or statements of intended or desired use. Thus, these claims as well as other statements of intended use do not serve to patentably distinguish the claimed structure over that of the reference. See *In re Pearson*, 181 USPQ 641; *In re Yanush*, 177 USPQ 705; *In re Finsterwalder*, 168 USPQ 530; *In re Casey*, 512 USPQ 235; *In re Otto*, 136 USPQ 458; *Ex parte Masham*, 2 USPQ 2nd 1647.

See MPEP § 2114 which states:

A claim containing a "recitation with respect to the manner in which a claimed apparatus is intended to be employed does not differentiate the claimed apparatus from the prior art apparatus" if the prior art apparatus teaches all the structural limitations of the claim. *Ex parte Masham*, 2 USPQ 2nd 1647

Claims directed to apparatus must be distinguished from the prior art in terms of structure rather than functions. *In re Danly*, 120 USPQ 528, 531

Apparatus claims cover what a device is not what a device does. *Hewlett-Packard Co. v. Bausch & Lomb Inc.*, 15 USPQ2d 1525, 1528.

As set forth in MPEP § 2115, a recitation in a claim to the material or article worked upon does not serve to limit an apparatus claim.

#### ***Response to Arguments***

4. Applicant's arguments filed 2-8-06 have been fully considered but they are not persuasive.

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The applicant has amended the claims citing that the 112 rejections have been overcome. On the other hand, the applicant is just switching from one word to the other for example "judging" has been changed to "judges"; "high" to "greater"; "low" to "less", etc. These changes have not changed the scope of the claims. Thus the rejection stands.

The applicant further argues that the prior art does not disclose evacuation possibility judging means which judge a possibility for the preceding vehicle to evacuate from the state of being the preceding vehicle to the own vehicle. The examiner disagrees. The applicant's argument is based on a functional language claim in an apparatus claim. In addition, this limitation has a 112 rejection above that needs to be overcome.

*MPEP 2114 [R-1] Apparatus and Article Claims — Functional Language*

For a discussion of case law which provides guidance in interpreting the functional portion of means-plus-function limitations see MPEP § 2181 - § 2186.

**APPARATUS CLAIMS MUST BE STRUCTURALLY DISTINGUISHABLE  
FROM THE PRIOR ART**

>While features of an apparatus may be recited either structurally or functionally, claims directed to an apparatus must be distinguished from the prior art in terms of structure rather than function. >In re Schreiber, 128 F.3d 1473, 1477-78, 44 USPQ2d 1429, 1431-32 (Fed. Cir. 1997) (The absence of a disclosure in a prior art reference relating to function did not defeat the Board's finding of anticipation of claimed apparatus because the limitations at issue were found to be inherent in the prior art reference); see also In re Swinehart, 439 F.2d 210, 212-13, 169 USPQ 226, 228-29 (CCPA 1971); < In re Danly, 263 F.2d 844, 847, 120 USPQ 528, 531 (CCPA 1959). "[A]pparatus claims cover what a device is, not what a device does." Hewlett-

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Packard Co. v. Bausch & Lomb Inc., 909 F.2d 1464, 1469, 15 USPQ2d 1525, 1528 (Fed. Cir. 1990) (emphasis in original).

MANNER OF OPERATING THE DEVICE DOES NOT DIFFERENTIATE  
APPARATUS CLAIM FROM THE PRIOR ART

A claim containing a "recitation with respect to the manner in which a claimed apparatus is intended to be employed does not differentiate the claimed apparatus from a prior art apparatus" if the prior art apparatus teaches all the structural limitations of the claim. *Exparte Masham*, 2 USPQ2d 1647 (Bd. Pat. App. & Inter. 1987) (The preamble of claim1 recited that the apparatus was "for mixing flowing developer material" and the body of the claim recited "means for mixing ..., said mixing means being stationary and completely submerged in the developer material". The claim was rejected over a reference which taught all the structural limitations of the claim for the intended use of mixing flowing developer. However, the mixer was only partially submerged in the developer material. The Board held that the amount of submersion is immaterial to the structure of the mixer and thus the claim was properly rejected.).

Applicant's arguments are drawn to limitations that have 112 issues. The 112 issues need to be cleared.

It is believed that the rejections are proper and stand.

***Communication***

5. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Ronnie Mancho whose telephone number is 571-272-6984. The examiner can normally be reached on Mon-Thurs: 9-5.

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If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Jack Keith can be reached on 571-272-6878. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Ronnie Mancho  
Examiner  
Art Unit 3663

2/21/06



JACK KEITH  
SUPERVISORY PATENT EXAMINER